A REPORT PREPARED FOR

Office of Health Care Access

JULY 2002

by



341 Mansfield Road Storrs, CT 06269 860-486-6666

CONTENTS

Section 1. Background and Objectives of Research	1
Section 2. Research Planning and Methodology Design	2
Section 3. Statewide Survey Overview	3
Section 4. Survey Results: Statewide Findings	4
A. Demographic Profile of the Uninsured in the State of Connecticut	6
B. The Relationship Between Employment Status and Insurance	11
C. Healthcare Access and Utilization	17
D. Reported Condition of Physical Health	20
Section 5. Conclusion	21
Appendix A. Detailed Methodology	22
Appendix B. Tables Detailing Row and Column Percentages	31

Illustrations

Figure 1.	Point in Time Estimates of Insurance Status	4
Figure 2.	Sources of Insurance Coverage, 2001 Connecticut Household Survey	4
Figure 3.	Uninsured/Insured Populations By Coverage Type - Dental	5
Figure 4.	Uninsured/Insured Populations By Coverage Type - Prescription Drugs	5
Figure 5.	Insurance Status Rates By Age Group	6
Figure 6.	Uninsured/Insured Populations By Age	7
Figure 7.	Insurance Status Rates By Race and Ethnicity	8
Figure 8.	Insurance Status Rates By Income Categories	9
Figure 9.	Insurance Status Rates By Marital Status	10
Figure 10.	Uninsured/Insured Populations By Marital Status	10
Figure 11.	Insurance Status Rates By Employment Status	11
Figure 12.	Uninsured/Insured Populations By Employment Status	12
Figure 13.	Uninsured/Insured Populations By Hours Worked	13
Figure 14.	Uninsured/Insured Populations By Employment Level	14
Figure 15.	Uninsured/Insured Populations By Company Size: Employees at Location	15
Figure 16.	Uninsured/Insured Populations By Educational Level	16
Figure 17.	Uninsured/Insured Populations By Sources of Care	17
Figure 18.	Uninsured/Insured Populations By Specific Usual Source of Care	18
Figure 19.	Uninsured/Insured Populations By Emergency Care	19
Figure 20.	Uninsured/Insured Populations By Health Status	20

Section 1. Background and Objectives of Research

As part of its ongoing research the Office Of Health Care Access (OHCA) applied for a State Planning Grant from the U.S. Department of Health and Human Services (DHHS) Health Resources and Services Administration (HRSA). The grant was approved and OHCA was awarded \$668,110 in March 2001 to develop a plan to increase the state's already high rate of health insurance coverage by identifying new coverage expansion options. A portion of that funding was used to field OHCA's 2001 Household Survey, which forms the basis for this report.

Policy analysis and development activities conducted during the grant period culminated in a proposal to pilot a small employer health insurance subsidy initiative in Connecticut. The pilot could benefit between 3,000 and 5,000 currently uninsured low wage workers and their families. Survey data suggest that this program targets a population that experiences higher than average rates of uninsurance.

Section 2. Research Planning and Methodology Design

OHCA's 2001 Connecticut Household Survey was a random digit dial (RDD) survey. During the course of the survey, interviews were completed with representatives of 4,081 Connecticut households. One person in each household was randomly selected to complete the survey. If this person was a child, a responsible adult was asked to respond on behalf of the child. The survey was designed to maximize overall statewide estimates of insurance coverage. A more detailed description of the methodology for this survey can be found in Appendix A.

OHCA contracted with the University of Connecticut's Center for Survey Research and Analysis (CSRA) to field this household survey. The OHCA 2001 Household Survey was administered by CSRA between August and October 2001. The data were collected through telephone interviews using a random digit dial (RDD) methodology via the GENESYS Sampling System to generate random samples of telephone households within the state. CSRA used a "list-assisted" method of sample frame enumeration to cross reference data obtained from national telephone exchange records with telephone directory information. The sample for the survey consisted of 14,333 telephone numbers, resulting in 4,081 total interviews, and 3,985 valid, fully completed person-level interviews.

The survey instrument was designed to be compatible with a coordinated state coverage survey instrument developed by the State Health Access Data Assistance Center (SHADAC), an organization funded by the Robert Wood Johnson Foundation and charged with conducting policy analysis and timely research on access issues and state health policy. Use of the coordinated state coverage survey and coordination with SHADAC may permit comparisons between Connecticut and other states that chose to use the same instrument and comparable methodologies.

There are different ways of defining the uninsured; this report makes a "point in time" estimate of their number. That is, those people who lacked health care coverage at the time of the survey are considered uninsured. This includes both people who were without insurance for the entire 12 months preceding the survey, as well as those who had insurance for some part of the preceding year, but had lost coverage and were uninsured at the time of the survey.

Section 3. Statewide Survey Overview

Across Connecticut, it is estimated that 5.6% or 185,201 civilian, non-institutionalized Connecticut residents were uninsured when the survey was conducted.

Although Connecticut's rate of uninsurance is comparatively low, there are key groups within the state that have higher levels of uninsurance. The survey shows that lower income households, younger adults, those who are single, and black, Hispanic or other members of minority groups are more likely to be uninsured. This survey was able to identify pockets of uninsured populations within key demographic groups:

- In Connecticut, blacks and Hispanics have uninsurance rates above the statewide average. In some cases these groups have twice the likelihood of being uninsured;
- Younger adults, those between the ages of 19 and 24, have three times the likelihood of being uninsured as the statewide average.
- Insurance status varies by income level. Those making under \$30,000 have twice the likelihood of being uninsured than the statewide average.
- An individual who is single has a greater likelihood of being uninsured than someone who is married.

In Connecticut, the self-employed have nearly the same uninsured rate (12%) as the unemployed (14%).

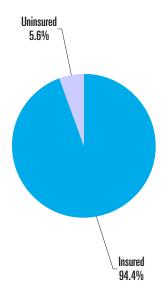
There are also differences in the way the uninsured access health care. In Connecticut, nearly half of the uninsured do not seek care from a doctor's office. They are more likely to use clinics and emergency rooms for obtaining health care.

Section 4. Survey Results: Statewide Findings

Across Connecticut, it is estimated that 5.6% or 185,201 civilian, non-institutionalized Connecticut residents were uninsured when the survey was conducted.

While nearly 6% across the state may be uninsured, this survey has identified pockets of uninsured populations among key demographic groups. As this report will discuss, the rate of uninsurance is higher among certain populations in the state. Race, marital status, employment status, and income play a role in whether or not an individual has health insurance.

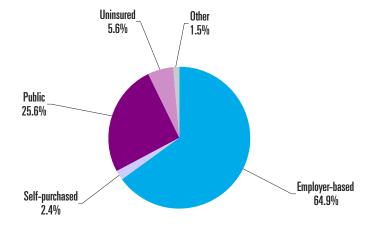
Figure 1. Point In Time Estimates of Insurance Status



Connecticut Health Insurance Coverage

Connecticut residents obtain health insurance coverage primarily through their employers.

Figure 2. Sources of Insurance Coverage, 2001 Connecticut Household Survey

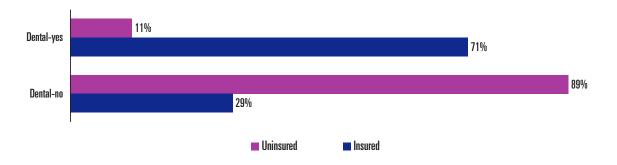


Specific Types of Coverage

Dental Care

Lack of health insurance coverage is often accompanied by lack of dental insurance. Fully, 89% of those who are uninsured do not have dental coverage. However, even some individuals with health insurance do not have dental coverage—approximately one-third (29%) covered by health insurance do not have coverage for dental care.

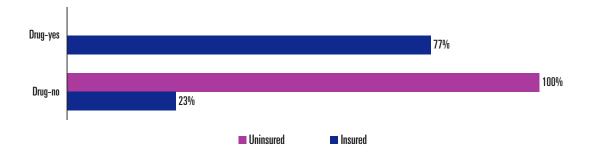
Figure 3. Composition of Uninsured/Insured Populations by Coverage Type - Dental



Prescription Drug Coverage

Nearly one-fourth (23%) of Connecticut residents with health insurance lack coverage for prescription drugs.

Figure 4. Composition of Uninsured/Insured Populations by Coverage Type - Prescription Drugs



A. Demographic Profile of the Uninsured in the State of Connecticut

Despite Connecticut's overall low rate of uninsurance, there are key groups within the state that have higher rates of uninsurance. The survey shows that lower income households, younger adults, those who are single, black or Hispanic are more likely to be uninsured.

Insurance by Age

Approximately 4% of children 18 years old and younger are uninsured. One in every seven uninsured Connecticut residents is a child. Less than 5% of all residents age 65 years and older are uninsured. Young adults are more likely to be without health care coverage and make up larger percentages of the uninsured than other age groups. For those age 19 to 24, 15% are uninsured and comprise 17% of the uninsured and for 25 to 34 year olds, 11% are uninsured and comprise 25% of the uninsured. Two factors may influence these higher rates:

- Young adults age 19 to 24 are in the process of establishing themselves in the labor market and may not yet be covered by traditional health plans, and
- this group is more likely to be single and thus lack married couples' ability to purchase employer-based insurance to cover a spouse.

Figure 5. Insurance Status Rates by Age Group

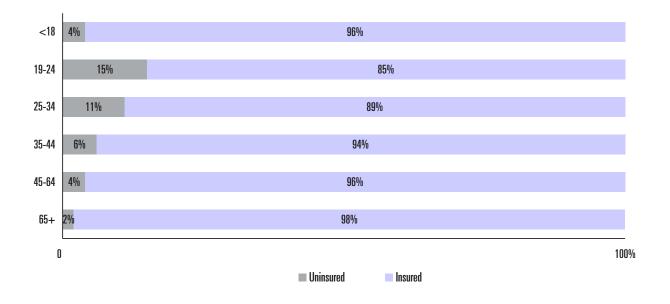
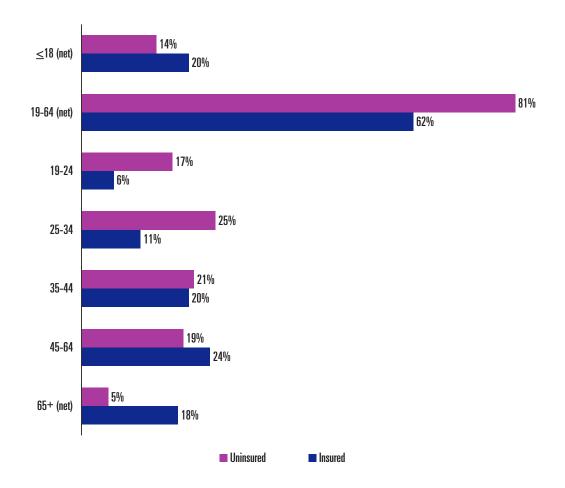


Figure 6. Composition of Uninsured/Insured Populations by Age



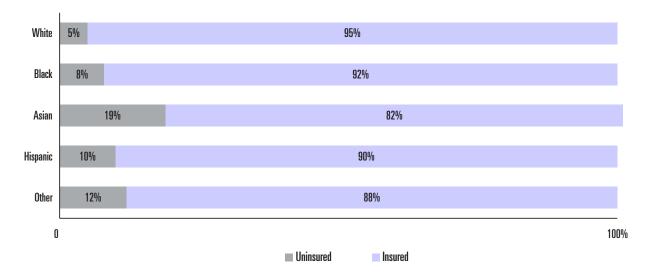
Insurance and Gender

In general, gender is not a significant factor influencing insurance status. Five percent of women were uninsured at the time of the survey, while 6% of men were without health care coverage.

Insurance: Race and Ethnicity

Race plays a role in the likelihood of having insurance with clear racial disparities in the rates of uninsured. The likelihood of non-whites being uninsured is twice that of whites. While 5% of whites are uninsured, 8% of blacks and 10% of Hispanics lack health care coverage.

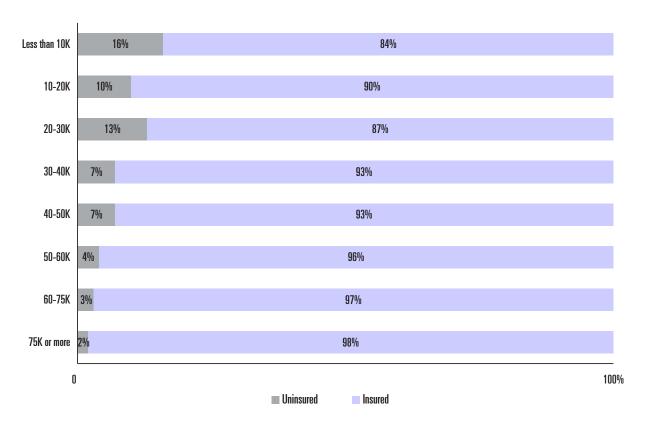
Figure 7. Insurance Status Rates by Race and Ethnicity



Insurance and Income

The survey showed that as family income increases, health insurance coverage becomes more prevalent. Approximately one in six (16%) of those people earning less than \$10,000 per year are uninsured, while only 2% of those earning more than \$75,000 annually do not have health insurance. While the rate of insured rises from 84% for those earning under \$10,000 per year to 90% for those with annual incomes between \$10,000 and \$20,000, it declines slightly for those with annual earnings between \$20,000 and \$30,000. For the two lower income groups, government programs contribute to the relatively high rates of insurance. However, eligibility for government programs generally declines as income rises, which may account for the drop in the number of insured people earning between \$20,000 and \$30,000 per year. As family income crosses the \$30,000 threshold, the proportion of the insured increases markedly.

Figure 8. Insurance Status Rates by Income Categories

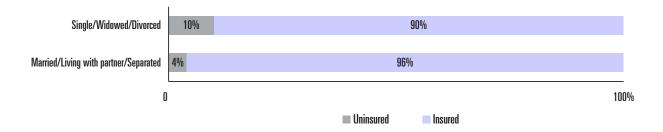


9

Marital Status and Insurance

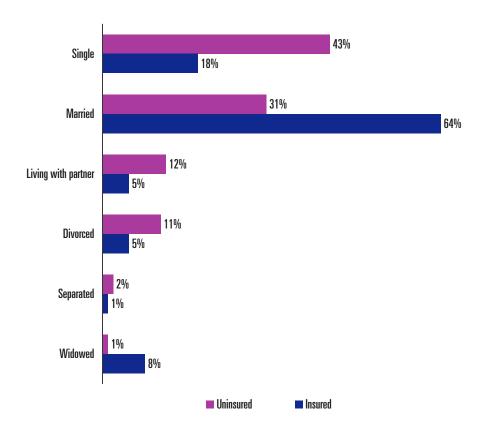
Although 87% of single people are insured, they are still more than twice as likely to be uninsured as married individuals. One in ten single, divorced or widowed individuals are insured, compared to 4% of those who are either married, living with a partner or separated.

Figure 9. Insurance Status Rates by Marital Status



Close to half (43%) of the uninsured are single, while an equal amount are either married (31%) or living with a partner (12%).

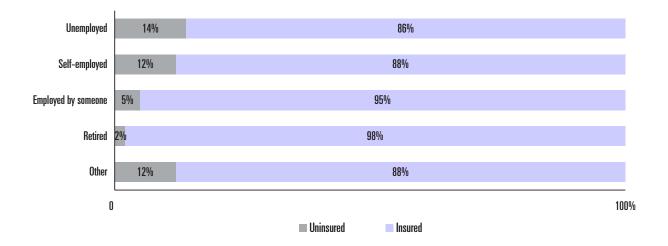
Figure 10. Composition of Uninsured/Insured Populations by Marital Status



B. The Relationship Between Employment Status and Insurance

Self-employed residents have an almost equal chance of being uninsured as someone who is unemployed. Nearly one in seven (14%) of those who are unemployed are uninsured. Similarly, 12% of those who are self-employed are also uninsured. Moreover, an individual who is self-employed is twice as likely to be uninsured as an individual who is employed by someone else.

Figure 11. Insurance Status Rates by Employment Status

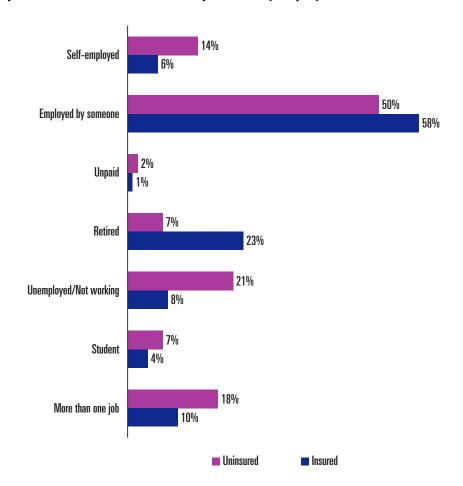


11

It is important to note that the self employed and the unemployed make up far smaller proportions of the population than those who are employed by someone else. Thus, over half of the uninsured (66%) are employed: 50% are employed by someone, 14% are self-employed or own their own business, and 2% are unpaid workers for a family business, farm, or home.

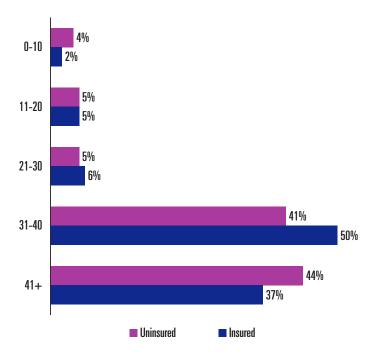
The unemployed make up a substantially greater proportion of the uninsured (21%) than the insured (8%).

Figure 12. Composition of Uninsured/Insured Populations by Employment Status



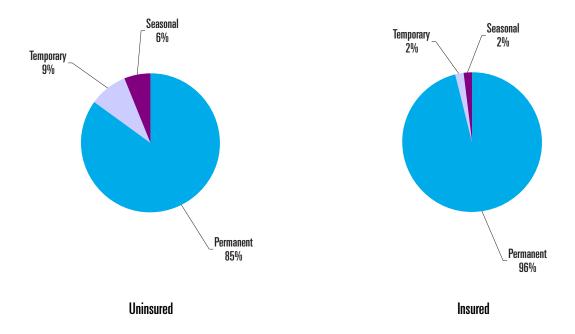
Connecticut's working uninsured are more likely to work more than 40 hours a week than those who are insured: 44% of the uninsured report working more than 40 hours a week, compared to 37% of the insured. Forty-three percent of the uninsured in Connecticut work between 31 and 40 hours a week. Only 9% of the uninsured reported working less than 21 hours a week, and 4% reported working between 21 and 30 hours a week.

Figure 13. Composition of Uninsured/Insured Populations by Hours Worked



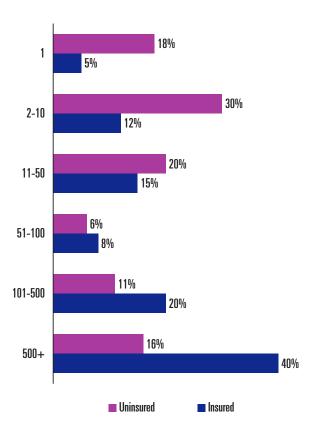
Seasonal and temporary workers are far less likely to have insurance than those who are permanently employed. While only 85% of the uninsured report having a permanent job, nearly all insured (96%) have a permanent job; 9% of the uninsured hold temporary jobs, and 6% have seasonal jobs.

Figure 14. Composition of Uninsured/Insured Populations by Employment Level



Connecticut's uninsured are most likely to work for small companies, 48% reported they work for companies with fewer than 11 people. One in five (20%) work for companies that employ 11 to 50 people, 6% work for companies with 51 to 100 employees. However, more than one quarter (27%) of the uninsured work for companies with more than 100 employees.

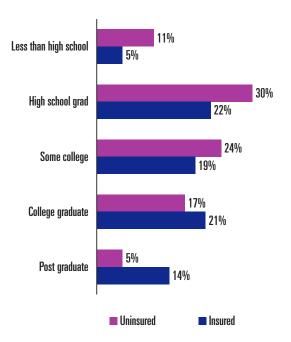
Figure 15. Composition of Uninsured/Insured Populations by Company Size: Employees at Location



Education Level and Insurance

Education and insurance status appear related, as the more educated adults make up smaller shares of the uninsured. People with a postgraduate degree are the least likely to be without an insurance (5%). However, 17% of the uninsured are college graduates. Thirty percent of the uninsured finished high school or obtained a GED and 24% have some college education, technical, or vocational school training. About one in ten (11%) of the uninsured have less than high school education.

Figure 16. Composition of Uninsured/Insured Populations by Educational Level



16

C. Healthcare Access and Utilization

The Usual Sources of Care

There are striking differences in how the uninsured and the insured seek care in times of illness. Those who are insured are far more likely than those who are uninsured to have identified a usual source of care when illness strikes. Fully, 95% of those who are insured have a regular provider in mind should they require such medical treatment. In contrast, far fewer (78%) uninsured have a usual source of primary care in times of illness.

Along with having a regular source of care, insurance status influences how people access the healthcare system and where they seek treatment for an illness. For those who have healthcare coverage, 87% elect to go to a doctor's office or group practice when illness strikes. In sharp contrast, slightly more than half (56%) of the uninsured seek medical attention at the office of a doctor. This means that more than 4 in 10 of those who are uninsured receive their health care outside of physician offices, most often in clinics or health centers.

Nearly one in every ten (9%) uninsured persons cite the emergency room as their usual source of care when ill. In sharp contrast, only 0.3% of those with insurance consider the emergency room as their usual source of care. Emergency room care is very expensive and this reliance creates both financial and resource burdens on the health care system.

Figure 17. Composition of Uninsured/Insured Populations By Source of Care Question: Is there a particular doctor office, HMO, hospital or other place where you go when you are sick?

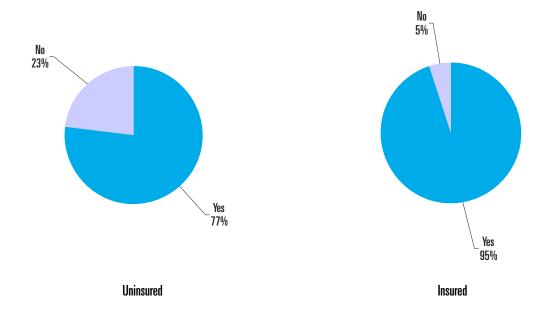
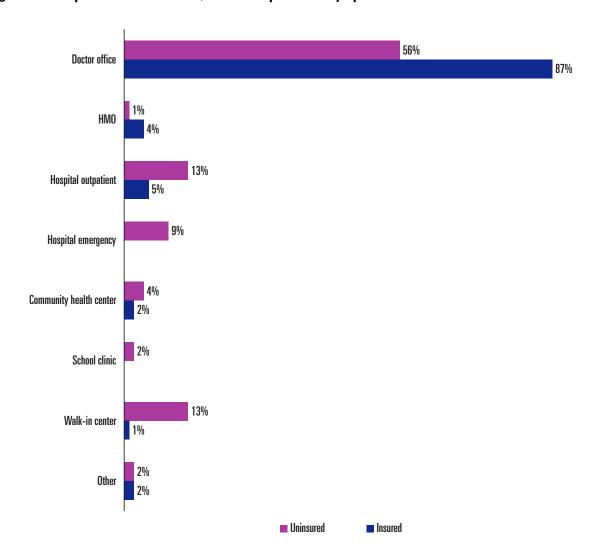


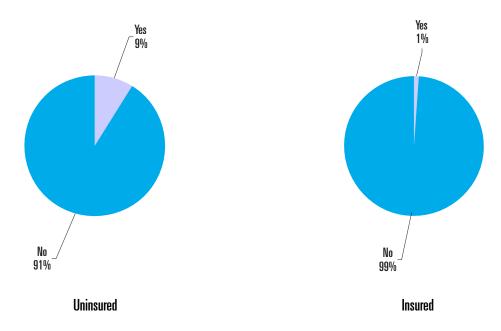
Figure 18. Composition of Uninsured/Insured Populations by Specific Usual Source of Care



Emergency Care

Insurance status also affects access to the health care system when it comes to needed emergency medical care. Nearly one in ten (9%) of the uninsured report experiencing an instance when they needed emergency care but did not get it, compared to 1% of those with insurance. The primary reason for not seeking emergency care in times of illness for the uninsured is simply "being uninsured or not being able to afford the care."

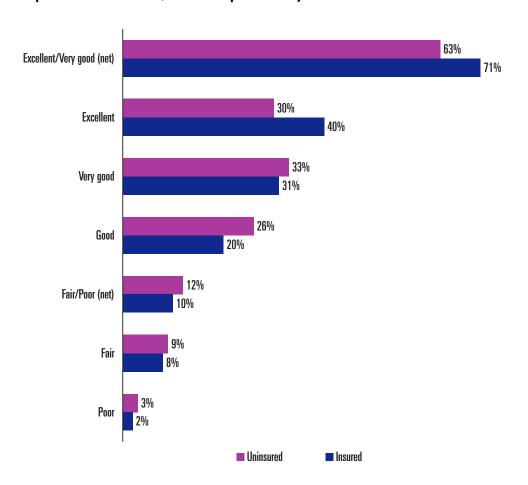
Figure 19. Composition of Uninsured/Insured Populations By Emergency Care Question: Needed Emergency Care But Did Not Get?



D. Reported Condition of Physical Health

While most people describe their health as excellent or very good, peoples' view of their health varies somewhat by whether or not they have health insurance coverage. Those with insurance are more likely to report being in excellent health condition than their uninsured counterparts. Overall, less than one-third (30%) of the uninsured describe their health status as excellent, whereas 40% of those with insurance think that their health is excellent. One-third (33%) of the uninsured define their health are very good, and one-quarter (26%) say it is good.

Figure 20. Composition of Uninsured/Insured Populations by Health Status



20

Section 5. Conclusion

While Connecticut has a relatively low rate of uninsured (5.6%), OHCA's survey revealed that certain population groups such as minorities, young adults, and the self-employed have rates that are double and even triple the statewide average. The survey also revealed that there are a significant number of uninsured working adults. And, despite the success of the HUSKY program, OHCA's survey findings indicate that 4% of children are uninsured. State policy makers can use survey findings as they continue to develop innovative strategies for covering those who remain uninsured in Connecticut.

Working Adults and Children

Connecticut has a significant population of uninsured working adults. In many cases, these uninsured individuals work more than forty hours per week yet do not have health insurance. Many of the working uninsured are self-employed. This group finds health care costs prohibitive, and therefore elect to forego health care coverage due to high premiums required. In order for Connecticut to continue to encourage the entrepreneurial advantages of a self-employed labor force, it must make commitments to finding coverage options for this group. In addition, young adults who are just starting out in the workforce or are no longer eligible under their parents' healthcare coverage, comprise 6 % of the state's population but are nearly three times as likely to be uninsured than any other age group in the state. Efforts to help working adults identify sources of healthcare options and making those choices readily available and affordable may help to reduce the number of the state's uninsured.

In Connecticut, uninsured children can buy in to the HUSKY program regardless of family income, so in effect, there is universal access to health coverage for children. Although the state has made considerable advances and currently has over 200,000 children in its Medicaid and HUSKY health insurance programs, this survey estimated that 4% of children under age 19 remain uninsured. In developing models for providing comprehensive access to health insurance coverage, the state has examined its currently strong system of employer-based health coverage. Providing employer-based family health insurance coverage to children who may be eligible for HUSKY A or B, but whose parents have declined to enroll them in such public programs, may be one way to reduce the number of uninsured children and families in Connecticut. Providing subsidies to enable workers to afford work-based coverage is one strategy that may not only expand coverage but will also offer a single and stable source of coverage for working families.

Appendix A. Detailed Methodology

2001 OHCA Household Survey Sample Design and Data Characteristics

Introduction

This Appendix describes the methods used to conduct the 2001 Connecticut Household Survey, including the sample design, instrumentation, data collection procedures, sample outcomes and weighting.

I. Sample Design

A. Overview

The sample for this project was designed to collect health insurance information using telephone survey data collection methods, for approximately 4,000 individuals in Connecticut.

The principal goal of the sample design was to provide effective statewide health insurance estimates for the civilian, noninstututionalized population.

B. Survey Population

The survey data can be taken to represent a probability sample of all individuals who reside in households with residential telephone service in Connecticut.

C. Coverage

Coverage error reflects the proportion of members of a target population who are excluded from the survey sample frame. In the case of all telephone surveys, individuals without residential telephone service are excluded from sample frames and survey populations. Data from the March 2001 Current Population Survey estimate that there are a total of 2,990,000 Connecticut total residents, with a total of 2,891,964 persons, or 96.69% of Connecticut residents, residing in households with residential telephone service. The CPS data was used, rather than the 2000 Census, because results at the level of detail necessary are just now being released. Consequently, the maximum coverage error possible for this survey is approximately 3.31%.

D. Sample Methodology

These surveys utilized a Random Digit Dial (RDD) methodology to generate random samples of telephone households in Connecticut. These samples were designed to include both listed and unlisted telephone numbers. Within each telephone household, one target was randomly selected.

The RDD samples were drawn following a list-assisted random-digit-dial methodology using the GENESYS Sampling System, which is licensed by CSRA. Random-Digit-Dial methodologies generate telephone numbers from banks of 100 telephone numbers (for example: 860.486.33xx is

the telephone bank which contains 100 telephone numbers from 860.486.3300 through 860.486.3399) (See Groves and Kahn 1979; Lepkowski, 1988).

CSRA telephone samples utilize a "list-assisted" method of determining which telephone banks to include in the sample frame (See Brick, Waksberg, Kulp and Starer, 1995). A list-assisted method of sample frame enumeration cross-references data obtained from national telephone exchange records with telephone directory information to determine telephone banks that contain listed telephone numbers. The GENESYS database is updated quarterly to contain all working banks with at least one directory-listed household. The principal database utilized to identify directory-listed households is the *Donnelly Quality Index*² *Database* (Marketing Systems Group, n.d.). In a simple form, this database is reduced to a file containing all eight-digit working banks that contain any telephone numbers, while excluding those that contain none. Due to data-entry errors in local telephone books, many working banks with only one directory-listed household are actually empty. To account for this, the sample files used for these surveys use a working-bank cut-off of two, meaning that all working banks in Connecticut with more than one directory listed household are contained in the sample frame.

E. Sample Screening

Screening was initially conducted to identify whether a telephone number was connected to a residential telephone household or some other outcome. In cases where a residential household was contacted, interviewers used a multi-stage process to screen households and randomly select one household member for interviewing.

Initially, interviewers contacted any responsible adult with knowledge of the health insurance status of various household members. A short screening interview was conducted with this adult to fully enumerate all household members. From this full household member enumeration, a computerized random selection procedure was performed to randomly select one household member as a target for full health insurance and health status data collection.

The randomly selected household member was asked to complete the survey. In cases where this was a different adult than the respondent who completed the household enumeration, interviewers scheduled an interview with the appropriate target at a convenient time. If the selected household member was a minor, or was unable to complete the survey because of health or other reasons, a responsible adult surrogate completed the interview for the minor.

F. Instrumentation

The survey instrument was based on several sources. The core component was an instrument developed in Minnesota under a grant from the HRSA. The instrument was revised based upon an earlier survey conducted on behalf of the Connecticut Office of Health Care Access in 1995, and based upon additional input from OHCA.

Extensive pre-testing was conducted by CSRA prior to finalization of the survey instrument. Initially, pre-testing was conducted with purposively selected respondents. This pre-testing was conducted

using a paper survey instrument. Following feedback from this testing, additional paper pre-tests were conducted using randomly selected respondents. A full pre-test was then conducted using a fully programmed Computer Assisted Survey Interviewing (CATI) instrument, using randomly generated sample and standard field protocols. The final questionnaire was edited based upon these pre-tests.

III. Data Collection Procedures

A. Overview

All interviews were completed by interviewers employed by the University of Connecticut's Center for Survey Research and Analysis (CSRA). To insure quality control and consistency, all interviews were conducted from a single centralized telephone facility located in Storrs, Connecticut. Interviews were continuously monitored during the data collection period. Monitoring at CSRA is conducted by supervisors and project management staff. CSRA monitoring is conducted as part of continuous quality improvement processes. Interviewers are given active feedback and suggestions about how to handle particular types of situations or questions.

B. Interviewing Protocols

Telephone interviews were conducted Monday to Friday (EST), 10:00 am to 6:00 pm on Saturday (EST) and 12:00 pm to 9:00 pm on Sunday. The majority of telephone call attempts for this study were made during evening and weekend hours. All potentially valid telephone numbers were called at least once during a weekday. More frequent attempts were made in the evenings and on weekends.

All potentially valid telephone numbers for this survey were called a minimum of ten times. Cases where a contact was made were called up to 30 times. CSRA maintains a team of highly experienced specialists in refusal conversion. In cases where a respondent, informant, or household refused to participate in a survey, at least one member of this team contacted the household to attempt to elicit cooperation.

CSRA also uses very flexible strategies for scheduling callbacks to increase cooperation. Our CATI system, which has extensive callback procedures including "Pop-Up" calendars available at any time, is an integral part of these techniques. Call-backs were scheduled at times convenient for each respondent.

C. Interviewer Training

All CSRA interviewers are trained in standardized interviewing techniques. All interviewers begin training with classroom instruction and readings from manuals that have been put together by the Manager of Interviewing Operations. These materials deal with survey research and good interviewing practices. This is followed by a classroom session of four to five hours, covering all aspects of our procedures. Then new interviewers conduct practice interviews with more senior interviewers as well as observe senior interviewers conducting actual interviews. Finally, the new interviewer conducts an actual interview while being monitored by a supervisor. CSRA interviewer recruitment and training procedures are highly successful. Thus rarely have we removed an interviewer from a project or terminated an interviewer.

CSRA places strong emphasis on refusal avoidance for all of our projects. Our affiliation with the University of Connecticut is a major factor in allaying respondent concerns, particularly in statewide studies such as the OHCA survey. Respondents with hesitations or doubts about a project can easily telephone a supervisor, and CSRA maintains a toll-free 800 number for this purpose. All interviewers receive special training in refusal avoidance techniques and strategies.

In addition to the standard training process, interviewers participated in customized training and briefing sessions for this project. All interviewers completed practice and mock interviews prior to completing actual interviews. Additionally, most CSRA interviewers were actively involved in the pre-test process, which provided substantial additional experience on this project prior to completing actual interviews.

D. Supervision

All interviews for this project were conducted from a central telephone facility in Storrs, Connecticut. The centralization of this facility permits consistent supervision of interviewers, and provides an easy mechanism for immediate communication between supervisors and interviewers. All CSRA interviews are centrally supervised by a telephone center supervisor who can monitor interviews in progress both on the phone and through the CATI program. Additional supervisors are also assigned to shifts with many interviewers. Supervisors monitor productivity and quality, and insure that consistent standards are maintained for all CSRA interviews.

E. Interviewer Monitoring

All interviewers are monitored and evaluated regularly by supervisors. Monitoring is done from a central station in the telephone center. Matters of interviewer error are discussed with the interviewer immediately, to facilitate on-going evaluation and refinement of technique.

F. Computer Assisted Telephone Interviewing (CATI)

Since the fall of 1996 CSRA has been utilizing the Vox Co CATI system. This system is a mature CATI system capable of meeting all requirements of CSRA surveys. It generates instantaneous reports to check for interviewer and data quality, including detailed sample disposition reports, marginal frequencies of completed surveys, and scheduled call-backs. The system's strong monitoring facilities permit supervisors to view the actual screen being used by the monitored interviewer.

G. Sample Management

Sample was allocated according to statistically identical replicates for appropriate management. This insures that at any given time in the field, all regions in Connecticut are represented proportionately in the sample. A series of daily reports were generated to evaluate sample efficiency and outcomes.

H. Data Editing and Coding

The CSRA CATI system performs most data-editing and coding procedures automatically, meaning that errors are typically avoided or caught in the survey interview process. The program accepts only

valid codes for questions. Skip patterns are automatically implemented, and logical checks are built into the survey.

Extensive consistency checks were conducted during pre-testing. Additionally, a series of logic checks were performed following data collection.

IV. Sample Outcomes and Sample Weights

A. Sample Outcomes

1. Overview

All CSRA sample dispositions and outcome rates are compatible with the American Association for Public Opinion Research (AAPOR) 2000 standards for Random-Digit-Dial surveys. The sample for the 2001 Connecticut Household Survey consisted of a total of 14,333 telephone numbers. The final dispositions for all telephone numbers in the sample fall into the following categories:

Not Households	3,025
No Eligible Respondent	198
Respondent Level Interviews	4,045
Household Level Interviews	36
Partial Interviews	6
Break-Off and Refusals	3,558
Non-Contact	975
Other	582
Unknown if Household	1,908
Unknown Other	0

A full elaboration of these outcomes is detailed in Table 1.

2. Response Rates

The response rate is the number of complete interviews with eligible reporting units in the sample. Current professional guidelines provide six calculations for response rates; the appropriate calculation depends on the nature of the sample, assumptions about unknown eligibility, and assumptions about partial interviews. Since the 36 household level interviews completed a household level interview, they will be considered as Eligible Interviewed Respondents for response rate calculations. The six

¹American Association for Public Opinion Research. 2000. Standard Definitions: Final Dispositions of Case Codes and Outcome Rates for Surveys. Ann Arbor, Michigan: AAPOR.

partial interviews who did not complete household-level questionnaires will be treated as Eligible Non-Interviewed respondents for response rate calculations².

The sample contained a total of 1,908 telephone numbers with unknown eligibility. Different response rates will be calculated depending on assumptions about what percentage of these numbers are actually households. The most conservative assumption is that all of these numbers are actually households. A response rate utilizing this assumption (RR1) yields a response rate of 36.73%. An estimate removing these unknown cases from the formula (AAPOR RR5) yields a response rate of 44.35%.

3. Cooperation Rates

The cooperation rate is the proportion of all eligible units contacted that are interviewed. Current professional guidelines provide four calculations for cooperation rates; the appropriate calculation depends on the nature of the contact (household versus individual), assumptions about partial interviews, and decisions about whether to include individuals who are incapable of being interviewed into the calculation.

Considering individuals who could not be interviewed, because of language and other problems, as eligible respondents (AAPOR COOP1) yields a cooperation rates of 49.60%.

Considering individuals who could not be interviewed, because of language and other problems, as ineligible respondents (AAPOR COOP3) yields a cooperation rate of 53.38%.

4. Refusal Rates

The refusal rate is the proportion of all eligible or potentially eligible units where a respondent refuses to complete an interview or breaks off an interview. Current professional guidelines provide six calculations for refusal rates; the appropriate calculation depends on the nature of the sample, assumptions about unknown eligibility, and assumptions about partial interviews. Since the sixteen partial interviews did not yield complete information for analysis, they will be treated as Eligible Non-Interviewed respondents for refusal rate calculations.

Assuming all unknown telephone numbers are actually eligible households (AAPOR REF1) yields a refusal rate of 32.03%.

An estimate removing all unknown cases from the formula (AAPOR REF3) yields a refusal rate of 38.67%.

²Most analyses based on individual level data for insurance status are actually conducted using a base of 3,985 respondents. The 36 respondents who only provide household level information are not included in this report. An additional sixty cases are also removed due to contradictory responses to insurance status questions that could not be resolved with reasonable certainty.

Table 1 Sample Outcomes

Total Sample: 14,333

Not Eligible (Household)		
Fax/Modem	FX	510
Disconnect	DC	1,524
Business	BU	991
		3,025
Not Eligible (Respondent)		
Ineligible	IL	84
Other	0T	114
		198
Unknown Eligibility		
No Answer	NA	1,745
Busy	BZ	163
		1,908
Eligible Non-Interviews Excluding Refusals		
Answering Machine	AM	895
Soft Unscreened Call-Back	SU	2
Soft Call-Back	SC	35
Hard Call-Back	HC	43
Not Used	CB	0
Deaf/Health Problems	DH	210
Spanish Speaking	SP	88
Language	LA	284
Not Used	DL	0
		1,557
Refusal and Break-Off		
Refusal	RE	458
Proxy Refusal	PR	79
Refused Information	RI	332
Refused Info—Conv.Attempt	VI	1,141
Refusal—Conversion Attempted	VE	1,288
Proxy Refusal—Conv. Attempt	VP	33
Interviewer Terminated	IT	119
Respondent Terminated	RT	108
		3,558
Completed Interviews		
Completed Interview	CO	4,045
Household Complete		36
Partial Complete	PC	6
		4,087

Table 2 Summary Outcomes

Interviews	I	4,081
Partial Interviews	Р	6
Refusal and Break-Off	R	3,558
Non-Contact	NC	975
Other	0	582
Unknown if Household	UH	1,908
Unknown Other	U0	0

Table 3
Selected Standard Outcomes

RR1	36.73
RR5	44.35
C00P1	49.60
COOP3	53.38
REF1	32.03
REF3	38.67
CON1	74.05
CON3	89.40

B. Weighting

1. Overview

In order to make appropriate projections to the survey population, two separate weights have been applied to this data.

A. PROBWGT represents a compound probability weight which accounts for differential probabilities of selection of respondents. This should be used to make inferences to individuals residing in telephone households. This weight adjusts for the following factors:

- Disproportionate probabilities of selection due to the number of telephone lines in a household.
- Disproportionate probabilities of selection due to the number of people living in a household.
- Differential non-response by county.

B. PSWGT represents a post-stratification weight that adjusts data to match the population characteristics of the civilian non-institutionalized population in Connecticut. This weight also incorporates all factors utilized in the probability weight, to permit accurate estimates of individuals. Population estimates are taken from the March, 2001, Current Population Survey, and are based on age and gender. The exact figures and categories used for this weight are displayed in Table 4.

Table 4
CPS Population Estimates Used for Weighting Cells

Gender	Age Categories	Frequency	Percent
Male	5 or less	90,621	3.03%
Male	6 to 10	71,104	2.38%
Male	11 to 18	116,423	3.89%
Male	19 to 24	101,931	3.41%
Male	25 to 29	87,045	2.91%
Male	30 to 34	111,096	3.71%
Male	35 to 39	133,781	4.47%
Male	40 to 44	158,411	5.30%
Male	45 to 49	132,385	4.43%
Male	50 to 54	69,048	2.31%
Male	55 to 59	78,077	2.61%
Male	60 to 64	72,720	2.43%
Male	65 to 69	69,914	2.34%
Male	70 Plus	144,610	4.84%
Female	5 or less	73,275	2.45%
Female	6 to 10	68,311	2.28%
Female	11 to 18	156,911	5.25%
Female	19 to 24	88,623	2.96%
Female	25 to 29	67,140	2.24%
Female	30 to 34	106,545	3.56%
Female	35 to 39	165,937	5.55%
Female	40 to 44	153,666	5.14%
Female	45 to 49	104,277	3.49%
Female	50 to 54	92,837	3.10%
Female	55 to 59	89,922	3.01%
Female	60 to 64	76,443	2.56%
Female	65 to 69	66,079	2.21%
Female	70 Plus	243,702	8.15%
		2,990,834	100.00%

Note: Data represent Weighted March 2001 Current Population Survey Estimates

References

Brick, J. Michael, Joseph Waksberg, Dale Kulp and Amy Starer: "Bias in List-Assisted Telephone Samples"; *Public Opinion Quarterly*, vol. 59, Summer 1995, pp. 218-235, 1995.

Groves, Robert M. and Robert L. Kahn. *Surveys by Telephone: A National Comparison with Personal Interviews*. New York: Academic Press, 1979.

Lepkowski, James M. "Telephone Sampling Methods in the United States," in Groves, et. al. *Telephone Survey Methodology*, New York: John. Wiley and Sons, 1988. pp. 73-98.

Marketing Systems Group, *Genesys Sampling Systems Methodology*; Philadelphia, PA (n.d.). [A version is available from: http://www.m-s-g.com/refernce/genmeth.htm]

Appendix B. Tables Detailing Row and Column Percentages

Insurance Status by Age Grouping (a)

Age Group		Total	Uninsured	Insured
18 Years	Col %	19.4%	13.8%	19.8%
or Less	Row %	100.0%	4.0%	96.0%
	Count	641,211	25,488	615,723
19-24	Col %	6.2%	16.5%	5.6%
	Row %	100.0%	14.9%	85.1%
	Count	205,174	30,635	174,540
25-34	Col %	12.1%	24.5%	11.4%
	Row %	100.0%	11.3%	88.7%
	Count	400,211	45,295	354,915
35-44	Col %	20.4%	21.4%	20.4%
	Row %	100.0%	5.9%	94.1%
	Count	673,262	39,632	633,630
45-64	Col %	24.1%	19.0%	24.4%
	Row %	100.0%	4.4%	95.6%
	Count	795,715	35,252	760,463
65 or Older	Col %	17.7%	4.8%	18.4%
	Row %	100.0%	1.5%	98.5%
	Count	582,053	8,898	573,154
	Total Count	3,297,626	185,201	3,112,425

Insurance Status by Age Grouping (b)

Age Status

(Three Categories)		Total	Uninsured	Insured
18 Years or Less	Col %	19.4%	13.8%	19.8%
	Row %	100.0%	4.0%	96.0%
	Count	641,211	25,488	615,723
19 - 64	Col %	62.9%	81.4%	61.8%
	Row %	100.0%	7.3%	92.7%
	Count	2,074,363	150,814	1,923,548
65 or Older	Col %	17.7%	4.8%	18.4%
	Row %	100.0%	1.5%	98.5%
	Count	582,053	8,898	573,154
	Total Count	3,297,626	185,201	3,112,425

Insurance Status by Gender

Gender		Total	Uninsured	Insured
Male	Col %	47.9%	53.4%	47.6%
	Row %	100.0%	6.3%	93.7%
	Count	1,579,302	98,922	1,480,380
Female	Col %	52.1%	46.6%	52.4%
	Row %	100.0%	5.0%	95.0%
	Count	1,718,324	86,279	1,632,045
	Total Count	3,297,626	185,201	3,112,425

Insurance Status by Race

Race		Total	Uninsured	Insured
White	Col %	86.3%	74.4%	87.1%
	Row %	100.0%	4.8%	95.2%
	Count	2,782,408	134,887	2,647,520
Black,	Col %	6.3%	9.4%	6.1%
African-American	Row %	100.0%	8.4%	91.6%
	Count	203,078	17,002	186,076
Asian, Indian	Col %	.9%	3.1%	.8%
•	Row %	100.0%	18.5%	81.5%
	Count	29,979	5,544	24,435
Other race? What	Col %	4.9%	10.5%	4.6%
race is that?	Row %	100.0%	12.1%	87.9%
	Count	157,473	19,094	138,378
	Total Count	3,222,346*	181,416	3,040,930

^{*}Differences in Total Count Base sizes are due to Refused and Don't Know Responses

Insurance Status by Ethnicity

Ethnicity		Total	Uninsured	Insured
Hispanic	Col %	6.4%	11.1%	6.2%
	Row %	100.0%	9.7%	90.3%
	Count	212,384	20,572	191,812
Not Hispanic	Col %	93.1%	87.8%	93.4%
·	Row %	100.0%	5.3%	94.7%
	Count	3,070,029	162,244	2,907,786
Refused	Col %	.4%	1.1%	.4%
	Row %	100.0%	14.4%	85.6%
	Count	14,320	2,056	12,264
	Total Count	3,296,733	184,871	3,111,862

Insurance Status by Income Category

Income Category		Total	Uninsured	Insured
Less than \$10K	Col %	2.8%	8.3%	2.4%
	Row %	100.0%	16.4%	83.6%
	Count	77,005	12,653	64,352
\$10K-\$20K	Col %	7.3%	13.2%	6.9%
	Row %	100.0%	9.9%	90.1%
	Count	202,045	19,948	182,098
\$20K-\$30K	Col %	9.1%	22.0%	8.4%
	Row %	100.0%	13.1%	86.9%
	Count	254,192	33,361	220,831
\$30K-\$40K	Col %	9.4%	12.5%	9.2%
	Row %	100.0%	7.3%	92.7%
	Count	260,127	18,979	241,149
\$40K-\$50K	Col %	12.3%	17.1%	12.1%
	Row %	100.0%	7.5%	92.5%
	Count	343,205	25,890	317,315
\$50K-\$60K	Col %	11.6%	8.7%	11.8%
	Row %	100.0%	4.1%	95.9%
	Count	322,069	13,195	308,874
\$60K-\$75K	Col %	12.1%	7.3%	12.3%
	Row %	100.0%	3.3%	96.7%
	Count	334,997	11,097	323,900
\$75+	Col %	35.5%	10.9%	36.9%
	Row %	100.0%	1.7%	98.3%
	Count	986,131	16,554	969,576
	Total Count	2,779,771	151,676	2,628,095

Insurance Status by Marital Status

Marital Status		Total	Uninsured	Insured
Single/Divorced/	Col %	32.4%	54.6%	31.0%
Widowed	Row %	100.0%	10.0%	90.0%
	Count	871,331	87,453	783,879
Married/Living with	Col %	67.3%	45.3%	68.7%
Partner/Separated	Row %	100.0%	4.0%	96.0%
	Count	1,811,157	72,587	1,738,570
Don't Know	Col %	.1%		.1%
	Row %	100.0%		100.0%
	Count	1,357		1,357
Refused	Col %	.3%	.2%	.3%
	Row %	100.0%	3.0%	97.0%
	Count	8,510	256	8,254
	Total Count	2,692,356	160,296	2,532,061

Insurance Status by Employment Status

Job Status		Total	Uninsured	Insured
Self Employed	Col %	6.8%	13.6%	6.4%
	Row %	100.0%	11.9%	88.1%
	Count	183,181	21,746	161,435
Employed	Col %	57.9%	50.3%	58.4%
	Row %	100.0%	5.2%	94.8%
	Count	1,553,325	80,280	1,473,046
Retired	Col %	22.1%	6.6%	23.1%
	Row %	100.0%	1.8%	98.2%
	Count	594,386	10,536	583,850
Unemployed	Col %	8.8%	21.0%	8.1%
	Row %	100.0%	14.1%	85.9%
	Count	237,386	33,522	203,864
Other Adult	Col %	4.3%	8.5%	4.0%
	Row %	100.0%	11.8%	88.2%
	Count	115,536	13,586	101,951
	Total Count	2,683,814	159,669	2,524,145

Insurance Status by Hours Worked/Week

Hours		Total	Uninsured	Insured
0-10	Col %	1.9%	4.0%	1.8%
	Row %	100.0%	11.0%	89.0%
	Count	29,603	3,247	26,356
11-20	Col %	5.2%	5.3%	5.2%
	Row %	100.0%	5.4%	94.6%
	Count	79,655	4,312	75,343
21-30	Col %	6.2%	5.4%	6.3%
	Row %	100.0%	4.6%	95.4%
	Count	94,940	4,379	90,560
31-40	Col %	49.4%	41.2%	49.8%
	Row %	100.0%	4.5%	95.5%
	Count	750,389	33,416	716,973
41+	Col %	37.2%	44.1%	36.8%
	Row %	100.0%	6.3%	93.7%
	Count	564,902	35,827	529,075
	Total Count	1,519,489	81,182	1,438,307

Insurance Status by Company Size: Employees at Location

Employees		Total	Uninsured	Insured
1	Col %	5.7%	17.5%	5.0%
	Row %	100.0%	17.2%	82.8%
	Count	90,585	15,601	74,984
2-10	Col %	12.7%	30.3%	11.7%
	Row %	100.0%	13.3%	86.7%
	Count	204,151	27,058	177,092
11-50	Col %	15.5%	20.3%	16.2%
	Row %	100.0%	7.3%	92.7%
	Count	248,460	18,082	230,379
51-100	Col %	8.0%	5.6%	8.1%
	Row %	100.0%	3.9%	96.1%
	Count	128,028	4,995	123,034
101-500	Col %	19.3%	10.7%	19.8%
	Row %	100.0%	3.1%	96.9%
	Count	308,486	9,523	298,963
500+	Col %	38.9%	15.6%	40.2%
	Row %	100.0%	2.2%	97.8%
	Count	622,562	13,954	608,607
	Total Count	1,602,273	89,214	1,513,059

Insurance Status by Level of Employment

EMPERM. Is this a permanent

temporary, or se	asonal job?	Total	Uninsured	Insured
Permanent	Col %	95.4%	85.4%	96.0%
	Row %	100.0%	5.3%	94.7%
	Count	1,649,509	87,100	1,562,409
Temporary	Col %	2.5%	8.7%	2.1%
	Row %	100.0%	20.5%	79.5%
	Count	43,602	8,926	34,676
Seasonal	Col %	2.1%	5.9%	1.9%
	Row %	100.0%	16.5%	83.5%
	Count	36,445	6,000	30,445
	Total Count	1,729,556	102,025	1,627,530

Insurance Status by Education Level

Education		Total	Uninsured	Insured
Less than High School	Col %	5.7%	11.3%	5.4%
(New Category)	Row %	100.0%	11.0%	89.0%
	Count	187,031	20,555	166,476
High School Graduate	Col %	22.7%	29.9%	22.3%
or GED	Row %	100.0%	7.3%	92.7%
	Count	742,644	54,209	688,435
Some College/Technical	Col %	19.3%	23.8%	19.0%
or Vocational School/	Row %	100.0%	6.8%	93.2%
Training	Count	630,672	43,162	587,510
College Graduate	Col %	20.9%	16.5%	21.1%
	Row %	100.0%	4.4%	95.6%
	Count	682,967	29,856	653,111
Postgraduate	Col %	13.0%	5.1%	13.5%
Degree/Study	Row %	100.0%	2.2%	97.8%
	Count	425,464	9,237	416,226
	Total Count	2,628,777	157,020	2,511,758

Insurance Status by Usual Source of Care

Is there a particular office, HMO, hospital or other place you/target

goes to when sick?		Total	Uninsured	Insured
Yes	Col %	94.0%	77.5%	94.9%
	Row %	100.0%	4.6%	95.4%
	Count	3,074,657	140,228	2,934,430
No	Col %	6.0%	22.5%	5.1%
	Row %	100.0%	20.6%	79.4%
	Count	197,980	40,779	157,201
	Total Count	3,272,637	181,006	3,091,630

Insurance Status by Specific Usual Source of Care

What kind of place is that?		Total	Uninsured	Insured
Doctor's office or	Col %	85.1%	56.1%	86.5%
group practice	Row %	100.0%	2.9%	97.1%
	Count	2,604,857	76,008	2,528,849
Health maintenance	Col %	3.4%	.6%	3.5%
organization (HMO)	Row %	100.0%	.8%	99.2%
	Count	104,583	846	103,738
Hospital outpatient clinic	Col %	4.9%	13.2%	4.5%
	Row %	100.0%	12.0%	88.0%
	Count	148,880	17,878	131,002
Hospital emergency room	Col %	.7%	9.2%	.3%
	Row %	100.0%	55.4%	44.6%
	Count	22,571	12,502	10,069
Community health center	Col %	1.6%	3.5%	1.6%
	Row %	100.0%	9.5%	90.5%
	Count	50,196	4,764	45,431
Public health department	Col %	.1%	.3%	.1%
	Row %	100.0%	12.9%	87.1%
	Count	3,324	430	2,894
Company industrial clinic	Col %	.2%		.2%
	Row %	100.0%		100.0%
	Count	5,891		5,891
School clinic	Col %	.4%	2.3%	.4%
	Row %	100.0%	22.8%	77.2%
	Count	13,462	3,066	10,396
Walk-in center	Col %	1.6%	13.1%	1.0%
	Row %	100.0%	36.7%	63.3%
	Count	48,424	17,765	30,659
Other	Col %	1.9%	1.6%	1.9%
	Row %	100.0%	3.7%	96.3%
	Count	57,688	2,141	55,547
	Total Count	3,059,877	135,401	2,924,476

Insurance Status by Yes/No Emergency Care

Needed Emergency

Care but Did not Get		Total	Uninsured	Insured
Yes	Col %	1.3%	9.0%	.9%
	Row %	100.0%	37.1%	62.9%
	Count	44,318	16,437	27,880
No	Col %	98.7%	91.0%	99.1%
	Row %	100.0%	5.1%	94.9%
	Count	3,241,412	165,859	3,075,552
	Total Count	3.285.729	182,297	3.103.432

Insurance Status by Why Not Receive Emergency Care*

		Total	Uninsured	Insured
No insurance/ cannot afford	Col % Row % Count	63.1% 100.0% 24,693	99.0% 65.9% 16,275	37.1% 34.1% 8,418
Provider wouldn't accept insurance	Col % Row % Count	13.6% 100.0% 5,311		23.4% 100.0% 5,311
Does not like/trust/ believe in doctors	Col % Row % Count	1.7% 100.0% 667		2.9% 100.0% 667
Thought problem would go away/didn't think it was serious	Col % Row % Count	1.1% 100.0% 415		1.8% 100.0% 415
Used home remedy/ self cure	Col % Row % Count	6.6% 100.0% 2,603	6.1% 38.7% 1,006	7.0% 61.3% 1,597
Did not know where to go/how to make an appointment	Col % Row % Count	3.8% 100.0% 1,501		6.6% 100.0% 1,501
Transportation problem—could not get to clinic/doctor	Col % Row % Count	1.9% 100.0% 738		3.2% 100.0% 738
Care too far away/ not convenient	Col % Row % Count	.6% 100.0% 218		1.0% 100.0% 218
Other (Specify)	Col % Row % Count	11.6% 100.0% 4,524	1.0% 3.6% 163	19.2% 96.4% 4,361
	Total Count	39,150	16,437	22,713

^{*}Respondents may give multiple responses

Insurance Status by Dental Care

Dental Care		Total	Uninsured	Insured
Yes	Col %	67.6%	10.5%	71.0%
	Row %	100.0%	.9%	99.1%
	Count	2,200,701	19,139	2,181,571
No	Col %	32.4%	89.5%	29.0%
	Row %	100.0%	15.5%	84.5%
	Count	1,053,938	163,742	890,196
	Total Count	3,254,648	182,881	3,071,767

Insurance Status by Drug Coverage

Drug		Total	Insured
Yes	Col %	77.4%	77.4%
	Row %	100.0%	100.0%
	Count	118,641	118,641
No	Col %	22.6%	22.6%
	Row %	100.0%	100.0%
	Count	34,661	34,661
	Total Count	153,302	153,302

Insurance Status by Health Status

Health Status		Total	Uninsured	Insured
Excellent	Col %	38.9%	29.7%	39.5%
	Row %	100.0%	4.2%	95.8%
	Count	1,281,081	54,121	1,226,960
Very Good	Col %	30.8%	32.5%	30.7%
	Row %	100.0%	5.9%	94.1%
	Count	1,012,066	59,242	952,824
Good	Col %	20.6%	25.9%	20.3%
	Row %	100.0%	7.0%	93.0%
	Count	677,268	47,258	630,010
Fair	Col %	7.8%	9.2%	7.7%
	Row %	100.0%	6.5%	93.5%
	Count	256,107	16,710	239,397
Poor	Col %	2.0%	2.8%	1.9%
	Row %	100.0%	8.1%	91.9%
	Count	64,373	5,194	59,179
	Total Count	3,290,895	182,525	3,108,370